
HOUSEHOLD AND NATIONAL FOOD SECURITY IN SOUTHERN AFRICA



Edited by

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**HOUSEHOLD STRATEGIES FOR COPING WITH
FOOD INSECURITY IN LOW-RAINFALL AREAS
OF ZIMBABWE**

**T. Matiza, L.M. Zinyama, and
D.J. Campbell**

209

**FARMER MARKETING STRATEGIES TO IMPROVE
FOOD SECURITY**

S. Chigume and J.D. Shaffer

223

**SECTION 6: EXPANDING AGRICULTURAL TRADE IN
THE SADCC REGION**

**EXCHANGE RATE OVERVALUATION AND
AGRICULTURAL PERFORMANCE IN
ZIMBABWE: 1965-1985**

K. Mlambo

243

**AGRICULTURAL PRICING POLICY AND
TRADE IN SEVERAL SADCC COUNTRIES:
PRELIMINARY RESULTS**

D.S. Kingsbury

259

**TRADER PERCEPTIONS OF CONSTRAINTS
TO EXPANDING AGRICULTURAL INPUT
TRADE AMONG SELECTED SADCC
COUNTRIES: PRELIMINARY RESULTS**

J. Rusike

277

SECTION 7: NUTRITION AND FOOD TRANSFERS

**EXPERIENCES IN INCREASING FOOD ACCESS
AND NUTRITION IN ZIMBABWE**

J. Tagwireyi

307

**NUTRITION AND AGRICULTURAL POLICY
ISSUES: CURRENT EVIDENCE AND RESEARCH
AGENDA**

C. Sindwazi

315

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NUTRITION AND FOOD TRANSFERS

EXPERIENCES IN INCREASING FOOD ACCESS AND NUTRITION IN ZIMBABWE

Julia Tagwireyi¹

INTRODUCTION

Factors which determine individual household access to food and adequate nutrition include the agro-ecological, economic, political, socio-cultural, and health factors; as well as natural and man-made disasters. At independence in 1980, the majority of Zimbabweans in both rural and urban areas had limited access to food. The war of liberation had disrupted food production and marketing activities. The land tenure system had allocated land to the rural peasant on the least productive soils. In addition, the peasant farmer had limited access to credit to improve crop yield and ensure adequate food security throughout the year. Access to agricultural extension services was also limited. Rural incomes were insufficient to purchase food, particularly where remittances from wage earners in the family were unavailable. In addition, the retail prices of food in the rural areas are much higher. Hence, large segments of the rural population had limited purchasing power to meet basic needs.

Subsistence farming suffered the heaviest blow with the onset of colonialism. When the rural areas became a pool for cheap labour for the urban areas, mines, and commercial farms, agricultural activities were disrupted. The ability of rural households to produce enough food to meet their needs became limited. In most cases, the burden of food production fell on women who already were burdened with other chores. The logical way to cope with this additional burden was to focus more attention on the less labour intensive crops such as maize, at the expense of the more nutritious sorghums and millets. Unfortunately, because women had limited access to agricultural extension services, coupled with high levels of illiteracy, they were not able to take advantage of any new developments in food production techniques.

Studies in 1980 indicated that at least 25% of the communal farmers did not produce enough food to last until the next harvest. In the urban areas, high unemployment coupled with low wages created severe hardships for the low income groups whose purchasing power was limited, but also had to provide for members of the family who had run away from the war in the rural areas.

Limited access to health care for rural Zimbabweans must have also taken its toll on agricultural production, thus limiting access to food. Poor health reduces productivity and many diseases create a nutritional drain on the individual; thereby reducing the ability of the individual to utilise food consumed and possibly leading to malnutrition.

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Surveys taken soon after independence indicated high levels of protein-energy malnutrition, particularly among children under five years. The incidence of malnutrition ranged from 30-60%. This high level of malnutrition in combination with the poor health status of the population contributed to the high infant mortality rate 120 per 1,000 live births in 1980.

Since independence, Zimbabwe has made tremendous efforts to produce enough food for its people. The country produces the variety of foods needed to enable us to obtain all the essential elements of a balanced diet. While we can boast of overflowing maize barns, many urban and rural households cannot boast of adequate food security and nutrition—even during a good harvest. Zimbabwe still has unacceptably high levels of protein-energy malnutrition among young children under five years of age for a country which is a net exporter of food. Studies show that groups most affected (in order of magnitude) are children of commercial farm workers, communal farmers, families in resettlement areas, and domestic workers.

CONSEQUENCES OF LIMITED ACCESS TO FOOD AT THE HOUSEHOLD LEVEL

Lack of access to adequate food often contributes to unnecessary and untimely loss of lives. It has been estimated that one-quarter of the African children do not reach their fifth birthday. Lack of access to adequate food is often implicated in this unnecessary and untimely loss of lives. Those who survive may not realise their full physical and mental potential because of malnutrition. Thus, they are unable to fully contribute to the work-force.

Finally, the rate of absenteeism, due to ill-health, is high in communities with limited access to food. No country in this region can afford this loss in its precious human resources.

IMPROVING ACCESS TO FOOD AND NUTRITION

One of the guiding principles behind efforts to improve access to food has been the government's commitment to the well being of the people. Both Zimbabwe's *Transitional and First Five-Year Development Plan* have clearly stated goals with regards to food security and adequate nutrition. While food security has been allocated to the agricultural sector, the task of articulating programmes to address malnutrition has been assigned to the Ministry of Health. However, this division of labour has led to a fragmented approach towards eliminating malnutrition.

Efforts to increase access to food and adequate nutrition can largely be categorised into:

- o activities implemented in response to emergencies such as drought and/or rehabilitation soon after the war of independence; and
- o strategies to improve the welfare of the people by facilitating access to food and adequate nutrition.

Emergency assistance

At independence, many rural families were displaced because they had abandoned their land for the safety of the towns, or had been confined in camps. The new government, with assistance from national and international agencies, mounted a *National Food Relief Programme* to provide a food ration to many families without access to food. A *Child Supplementary Scheme* was instituted to ensure that the special needs of the vulnerable 0-5 year old group were met. In addition to food handouts, seed and fertilizer were distributed to help families resume farming. Incentives were also offered for growing maize, our major staple. Access to credit to purchase inputs and favourable terms of repayment contributed to a record bumper harvest in 1981.

The interministerial and interagency machinery which had been in operation during the post-independence period of national reconstruction and rehabilitation was revived to manage the drought of 1982-83, under the chairmanship of the Ministry of Labour and Social Services, including representation from the Ministries of Agriculture, Local Government, Health, National Supplies, and Finance and Economic Planning.

The main objective of the *Drought Relief Programme* was to minimise the impact of drought on the population by providing food relief to affected families, as well as a supplementary meal to children under five years. Able-bodied men and women were given the opportunity to work on selected development projects in their communities in exchange for food and a daily wage of Z\$2.00. The wage minimized the danger of creating a dependency on food handouts and the scheme assisted the communities to develop by building bridges and roads.

The major feature of the *Food Relief Programme* was that it utilised foods normally grown and consumed in Zimbabwe (i.e., maize-meal, beans, and groundnuts). This helped to reinforce the view that our foods are capable of supporting adequate nutrition. A major problem was the lack of adequate data for planning and rationalizing the *Food Relief Programme*. However in spite of these difficulties, the overall goal of minimising suffering and loss of life through lack of access to food was achieved.

Long-term efforts to improve access

In the majority of cases, poverty is essentially the root cause of the lack of adequate access to food. Eventually, improvements in overall socio-economic development will overcome these problems. This is a long process, but the majority of people cannot afford to wait that long. Although the government has tried to redress this situation, unfortunately, these measures have not managed to keep abreast with the rapidly rising cost of living. The economic situation has not permitted government to continue some of the consumer food subsidies. Gradual removal of food subsidies, and because the lower income group continue to pay more for their food, has limited their access to food. The current poverty datum line is over Z\$250 per month, yet the minimum wage of Z\$100 per month falls below this level (US\$ 1.00 = Z\$ 1.90).

The land question, which was a burning issue in our fight for independence, remains a thorn in the flesh. Government has had limited success in resettling

families on good land purchased in commercial farming areas. Funds to continue purchasing the farms are very limited and it will be a long time before the land issue is settled. In the meantime, government has focussed attention on making the communal farming areas which are mainly in low-rainfall Natural Regions IV and V more productive by:

- o providing more agricultural extension services to assist communal farmers to improve their farming methods;
- o providing small farmers with access to credit to buy agricultural inputs through the Agricultural Finance Corporation (AFC);
- o promoting cooperatives to provide communities with access to credit and inputs at lower unit cost through bulk purchases, enabling families to purchase inputs who would otherwise not have access to cheaper inputs;
- o introducing favourable agricultural pricing policy which had provided incentives to the farmers to produce surpluses--particularly our staple crop maize, to the extent that over 60% of the maize crop is now produced by communal farmers. There is a need, however, for the pricing policy to address the food requirements and needs of the people.

These measures have made food security at the national level a reality. However, the security at the household level has not been adequately addressed. This explains the contradiction of over-flowing maize silos and malnutrition. Our food balance sheets indicate sufficient food for everyone. Unfortunately, for many people access to this food is limited, particularly those in the low income groups.

IMPROVEMENT IN THE STATUS OF WOMEN

Women in Zimbabwe, like other countries in Africa, are the main producers of food in the rural areas. Any improvement in their status will benefit food production. Government has initiated some policies which have facilitated the contribution of women to the development process and enhanced their role as farmers.

The *Age of Majority Act* has allowed women to be adults and, in theory, gives them access to credit in their own right. The literacy programme has opened up new avenues of information for women farmers. For example, they can read the instructions on how to use fertilizers, pesticides, etc., and benefit from written extension information. Eventually, as more rural women have access to education, they will take advantage of the incentives offered for agricultural production.

Particularly in the rural areas, the pre-school programme has in addition to providing the child with stimulation and an early start in the education process, freed women to participate in developmental activities in their communities with the assurance that the young toddler is being looked after.

The excessive workload which is the heritage of most rural women has been markedly reduced in some cases because of government policy to provide basic amenities such as water, health care facilities, etc. within reasonable distance.

With independence, more women entered the formal employment sectors as new opportunities for employment opened up. This development has improved food access in families where both spouses are employed. Studies also indicate that food

access is greatly improved when the woman has adequate access to the financial resources of the families.

IMPROVEMENT IN HEALTH CARE DELIVERY

At independence, Zimbabwe inherited a health system which was heavily skewed towards expensive curative services for urban areas with limited services in rural areas. Zimbabwe, together with the rest of the developing world, has disease patterns associated with poor socioeconomic development. Communicable diseases, conditions related to pregnancy, child birth and the new-born period, and nutritional disorders are the predominant health problems.

These health problems tend to be interrelated and malnutrition is often implicated in the seriousness of the disease or its onset. For example, malnutrition increases the frequency and severity of infections such as measles and is itself aggregated by infections.

The interrelated nature of these health problems and their origins in socio-economic underdevelopment and poverty are the basis for the government's decision to adopt primary health care (PHC) as the strategy to provide health care to its people. The priority for the government was to ensure equitable distribution of health services. Although the resources needed for this enormous task were considerable, the PHC strategy was the logical choice since it enlists the resources of all ministries and agencies striving for the well-being of the nation.

The *Alma Ata Declaration of 1978* defined primary health care as "essential Health Care based on practical, scientifically, and socially acceptable methods and technologies made universally accessible to individuals and families in the community and at a cost that the country can afford".

Therefore, PHC addresses health problems by providing promotive, preventive, curative, and rehabilitative services. The following elements are essential to the successful implementation of PHC:

- o education;
- o communicable disease control;
- o immunization;
- o maternal and child health and family planning;
- o provision of essential drugs;
- o provision of adequate food supply and nutrition
- o treatment and prevention of minor ailments; and
- o provision of safe water and sanitation.

The government formulated a new health policy in 1980 which had primary health care as its cornerstone. Recent evaluation of PHC in Zimbabwe indicate that some progress has been made in improving the health status of the Zimbabwe people as Table 1 illustrates.

Specific food and nutrition activity

Activities which have been implemented within the PHC strategy and may have contributed to an improvement in nutritional status are discussed below.

Table 1. Some indicators to illustrate the improvement in health and nutrition status, Zimbabwe, selected years.

Indicator	1982	1984	1987	1988
Children fully immunized (%)	27	42	67	85
Children under the age of 5-years with a child health card (%)	99	79.3	90	na
Nutritional status of children under 5-years (weight for age) ^a	25-42	23.5	17	na
Infant mortality rate (per 1,000 births)	100-120	85	60	na

^a Percentage less than 80% normal weight for age.

na = data not available

Source: Ministry of Health.

Growth monitoring and nutrition surveillance

Growth in young children is a good indicator of adequate diet and good health status. At clinics throughout the country, young children under five have their weights taken regularly on a home-made card. These sessions offer the health worker an excellent opportunity for individual counselling with the parents or guardian on nutrition. This information on weights and ages of children attending clinics is now being analyzed regularly. This information helps identify areas with high levels of malnutrition and in need of interventions.

Nutrition education through formal and the non-formal systems

Our main focus has largely been to standardize the concepts being promoted through formal training programmes, largely within the health and education sectors.

Food safety

The *Food and Food Standards Act* falls under the Ministry of Health. We have been concerned about our antiquated food regulations and have been trying to improve food safety standards to safeguard the health of our people and ensure a safe food industry.

Coordination

We have established interministerial Food and Nutrition Committees at the national, provincial, district, ward, and village levels to identify food and nutrition problems and propose community-based projects to address the problems. We have now created a basis for integrating nutrition into development activities at the various levels.

REFERENCES

- FAO and WHO. 1986. *Proceedings of the ad hoc FAP/WHO expert consultation on health and nutritional aspects of agriculture and rural development projects.*
- World Bank. 1983. *Zimbabwe: Population, health, and nutrition sector review.* Washington, D.C.
- Zimbabwe Government and UNICEF. 1980. *National nutrition survey.*
- Zimbabwe Government. 1980. *Equity in health and transitional development plan and 5-year development plan.*
- , 1982. *Infant feeding practices nutrition survey.*
- , 1985. *National household nutrition survey.* Unpublished.
- , Ministry of Health, 1984-1987. *Primary health care review.*



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